

Date: Mon, 11 Oct 93 23:40:55 PDT  
From: Info-Hams Mailing List and Newsgroup <info-hams@ucsd.edu>  
Errors-To: Info-Hams-Errors@UCSD.Edu  
Reply-To: Info-Hams@UCSD.Edu  
Precedence: Bulk  
Subject: Info-Hams Digest V93 #1211  
To: Info-Hams

## Today's Topics:

\* MODs for HeathKit Linears ? \*

## Daily Solar Geophysical Data Broadcast for 11 October idea for ground radials

Imminent Death of Ham Radio: 2m HT in Penney's Christmas Catalog  
IRCT filters anyone?

Macintosh-based code practice?  
MOTOROLA  
Newsline #842  
Sunspots  
Voice Keyers & TS850

Send Replies or notes for publication to: <Info-Hams@UCSD.Edu>  
Send subscription requests to: <Info-Hams-REQUEST@UCSD.Edu>  
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Info-Hams Digest are available (by FTP only) from UCSD.Edu in directory "mailarchives/info-hams".

We trust that readers are intelligent enough to realize that all text herein consists of personal comments and does not represent the official policies or positions of any party. Your mileage may vary. So there.

Date: 11 Oct 93 21:01:44 GMT  
From: ncrgw2.ncr.com!ncrhub2!ncrclm!tskelton@uunet.uu.net  
Subject: \* MODs for HeathKit Linears ? \*  
To: info-hams@ucsd.edu

I have found the SB220 to work nicely on 18 MHz with the bandswitch in the 15 meter position. It reportedly also works on 24 MHz in the 10 or 15 meter position. I also checked it on 30 meters into a dummy load...yes, I know the power output is limited to 200 watts but I don't have a 30m antenna anyhow. It does nicely on 30 meters using the 20 meter position. A friend

does similar tricks with his SB200. Please remember that there will be some effect due to the bandwidth of the antenna you are using. That is, on 18 MHz you may get a better resonance (plate dip) with band switch in 20 meter position. As always, your mileage will vary. 73, Tom WB4IUX

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Date: 11 Oct 93 16:33:53 -0700  
From: dog.ee.lbl.gov!agate!howland.reston.ans.net!vixen.cso.uiuc.edu!  
newsrelay.iastate.edu!destroyer!ntp.cs.ubc.ca!malins.mala.bc.ca!  
babiyd@network.ucsd.edu  
Subject: 2 meter handheld questions.  
To: info-hams@ucsd.edu

Hello, I'm a newly minted ham, I live up in Canada, and I'm frankly overwhelmed with all the choices and options in the 2 meter handheld market.

Could someone go over the important features, what to look for, what features are just "never used buttons" and maybe some suggestions as to what models and rigs work well for them?

Related question: I'm likely going to be toating this poor handheld between home, the car and school, now as a base site unit, how important would an amp become, remebering that the HT is only gonna put out a max of 5 watts. What would the range become if I put 30 watts out through a 1/2 wave vert monopole? Assume better then avg terrain, I live on an island, and my major target is a city across the salt-pond... what sort of range can I expect with an amp and without w/o using repeaters?

Thankyou very much,  
Dale Babiy

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Date: 12 Oct 93 04:58:24 GMT  
From: news-mail-gateway@ucsd.edu  
Subject: Daily Solar Geophysical Data Broadcast for 11 October  
To: info-hams@ucsd.edu

!!BEGIN!! (1.0) S.T.D. Solar Geophysical Data Broadcast for DAY 284, 10/11/93  
10.7 FLUX=102.7 90- AVG=096 SSN=083 BKI=4344 3424 BAI=021  
BGND-XRAY=B2.2 FLU1=3.8E+06 FLU10=1.0E+04 PKI=4444 4424 PAI=022  
BOU-DEV=044,032,049,050,031,044,017,042 DEV-AVG=038 NT SWF=00:000

```
XRAY-MAX= C1.2 @ 0906UT XRAY-MIN= B1.2 @ 0700UT XRAY-AVG= B2.8
NEUTN-MAX= +003% @ 2015UT NEUTN-MIN= -001% @ 1845UT NEUTN-AVG= +0.3%
PCA-MAX= +0.2DB @ 1515UT PCA-MIN= -0.3DB @ 1725UT PCA-AVG= +0.0DB
BOUTF-MAX=55368NT @ 2333UT BOUTF-MIN=55331NT @ 1553UT BOUTF-AVG=55353NT
GOES7-MAX=P:+000NT@ 0000UT GOES7-MIN=N:+000NT@ 0000UT G7-AVG=+063,+000,+000
GOES6-MAX=P:+109NT@ 2023UT GOES6-MIN=N:-071NT@ 1232UT G6-AVG=+086,+018,-045
FLUXFCST=STD:100,100,095;SESC:100,100,095 BAI/PAI-FCST=010,005,005/015,010,010
KFCST=3343 2221 1223 2221 27DAY-AP=031,017 27DAY-KP=5455 3333 4543 3223
WARNINGS=*SWF
ALERTS=
!!END-DATA!!
```

NOTE: The Effective Sunspot Number for 10 OCT 93 was 40.0.  
The Full Kp Indices for 10 OCT 93 are: 4+ 4+ 4- 5- 4+ 3- 3o 4-

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Date: Mon, 11 Oct 1993 22:27:06 GMT  
From: fluke!rem@beaver.cs.washington.edu  
Subject: idea for ground radials  
To: info-hams@ucsd.edu

In article <9310081327.AA08076@wa2cjt.wellfleet> ginsburg@wellfleet.COM (Scott Ginsburg) writes:

>  
>Has anyone tried the following idea for installing ground radials for an  
>HF vertical: get some multi-conductor rotor cable, and make cuts that would  
>result in each conductor being 1/4 wavelength on a single band. For example,  
>if you wanted radials for 40, 30, 20, 15 and 10, start with a piece of  
>5-conductor cable of length 34', and make 4 cuts stripping away the unneeded  
>wire. The cable after being chopped up would look something like:

>  
>----- 34'  
>----- 23'  
>----- 16'  
>----- 11'  
>----- 8'  
>

>Is this a reasonable idea? Has anyone out there tried this?

The length of these wires are not only dependent on the bands you want to work. You pick the lowest band you want to work and then decide how many radials you can put into the ground. You are doing this in or on top of the ground aren't you?

If you can only do say 50 radials then they only need to be .2 wavelength of the lowest frequency. If you are only putting down 20 radials then less than a tenth of a wavelength long need be the length.

The key here is how far apart will the radials be at their ends. If not to many are put in the ground then the distance between the radials get so far apart that the return path for the electric field has to go through too much earth to make adding more length to these radials of any value.

There is a table in the ARRL Antenna Book that indicates the best length for radials vs the number of radials you plan to put down.

When radials are buried in the ground they don't have to be some special 1/4 wavelength for each band. The radials are just improving the "ground" around the vertical not providing the ground by itself.

If you are putting a ground plane above ground, like on a roof, then the length is critical because now you are making a bent dipole where the radial is acting as one half the antenna with the vertical radiator.

Randy  
AJ7B

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Date: 11 Oct 1993 22:20:57 GMT  
From: koriel!male.EBay.Sun.COM!jethro.Corp.Sun.COM!exodus.Eng.Sun.COM!oversteer!  
wdh@ames.arpa  
Subject: I LOVE CW!!!!  
To: info-hams@ucsd.edu

Jeffrey.n.Jones writes:

>I stand before you today my fellow CW lovers with a confession to  
>make. I have strayed! Yes, indeed, I have strayed. In a moment of  
>weakness I picked up my microphone and spoke upon the air.

Sounds like you are suitably ashamed...and well you should be...as  
you've basically become a CB'er.

Real ham radios don't have microphones.

...Dennis Henderson, N6TTW

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Date: 11 Oct 1993 22:59:54 GMT  
From: koriel!newscast.West.Sun.COM!abyss.West.Sun.COM!sunspot!myers@ames.arpa  
Subject: I LOVE CW!!!!  
To: info-hams@ucsd.edu

In article mbjn29INN8vf@exodus.Eng.Sun.COM, wdh@oversteer.Eng.Sun.COM (Dennis

Henderson) writes:

>Jeffrey.n.Jones writes:

>>I stand before you today my fellow CW lovers with a confession to  
>>make. I have strayed! Yes, indeed, I have strayed. In a moment of  
>>weakness I picked up my microphone and spoke upon the air.

>

>Sounds like you are suitably ashamed...and well you should be...as  
>you've basically become a CB'er.

You've really cut him down to size!

>Real ham radios don't have microphones.

Excuse me! Suppose you were in a really bad crash and your CW key was broken; if you have a microphone, at least you have a backup.

I don't actually use ham radios for VHF/UHF. Instead, I prefer the quality and reliability of a Motorola. It saves me from having to do frequent checks on the local repeaters to be sure my radio is still working. I can just pick up the microphone with the distinctive blue "M" and communicate.

---

\* Dana H. Myers KK6JQ, DoD 466 | Views expressed here are

\*

\* (310) 348-6043 | mine and do not necessarily \*

\* Dana.Myers@West.Sun.Com | reflect those of my employer

\*

\* This Extra supports the abolition of the 13 and 20 WPM tests \*

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Date: Tue, 12 Oct 1993 00:03:05 GMT

From: csus.edu!netcom.com!fmitch@decwrl.dec.com

Subject: I LOVE CW!!!!

To: info-hams@ucsd.edu

Dennis Henderson (wdh@oversteer.Eng.Sun.COM) wrote:

: Jeffrey.n.Jones writes:

: >I stand before you today my fellow CW lovers with a confession to  
>make. I have strayed! Yes, indeed, I have strayed. In a moment of  
>weakness I picked up my microphone and spoke upon the air.

: Sounds like you are suitably ashamed...and well you should be...as  
>you've basically become a CB'er.

: Real ham radios don't have microphones.

: ...Dennis Henderson, N6TTW

you're right dennis, they have data jacks - good for data mode 0 (CW Morse)  
plus modern modes...

...mitch, wa4osr

--  
fmitch@netcom.com

Felton Mitchell, WA4OSR in Mobile, Alabama USA  
co-sysop for W4IAK bbs running fbb ... sysop for WA4OSR DXCluster in Mobile..

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Date: Mon, 11 Oct 1993 22:31:48 GMT  
From: fluke!rem@beaver.cs.washington.edu  
Subject: I LOVE CW!!!!  
To: info-hams@ucsd.edu

In article <CELCA1.FMK@cbnewsm.cb.att.com> jeffj@cbnewsm.cb.att.com  
(jeffrey.n.jones) writes:  
>I stand before you today my fellow CW lovers with a confession to  
>make. I have strayed! Yes, indeed, I have strayed. In a moment of  
>weakness I picked up my microphone and spoke upon the air. The shame  
>that I felt was simply overwhelming. For speaking on the air I have  
>given the anti-CW types added ammunition for their wishfull thinking that CW  
>is a dying mode. I was simply frustrated at not being able to find a  
>quiet spot upon which to call CQ in our crowded CW segment of the band.  
>I searched and searched to no avail and so in a moment of pique I went  
>to a quiet portion of the phone band (of which there are many) and  
>called CQ. There I had a nice ragchew with another ham like many that  
>I have had on CW. However it didn't have that same feeling as a good  
>ragchew on CW. So as I stand here before you I promise to almost never  
>transgress upon the phone portions again. I have only one more thing to  
>say to you, I LOVE CW!!!! HAHAHAHA THEY WILL HAVE TO PRY THE KEY FROM  
>MY COLD DEAD FINGERS BEFORE I'LL EVER STOP DOING CW. HAHAHAHA  
>Thank you. 8-)  
>

Did you forget that you can send CW in the "voice" section of the bands??

Randy  
AJ7B

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Date: Mon, 11 Oct 93 23:53:25 GMT  
From: mentor.cc.purdue.edu!noose.ecn.purdue.edu!en.ecn.purdue.edu!n9ljk@purdue.edu

Subject: Imminent Death of Ham Radio: 2m HT in Penney's Christmas Catalog  
To: info-hams@ucsd.edu

In article <2533@indep1.UUCP> clifto@indep1.UUCP (Cliff Sharp) writes:

>

> Years and years ago, Sears carried both a synthesized and a crystal-  
>controlled 2M mobile radio. Looked JUST like a CB, down to having 23  
>"channels" on the frequency switch (the xtal-bound unit, that is). SO  
>many CBers bought them that two meters here became a wreck. In fact,  
>it appears to be the cause of a "nonstandard" operating mode in the  
>Chicago area; if one wants to break into a conversation, the convention  
>is not to say "break", it's to sign with your call. This was to make  
>sure the breaker HAD a call.

> Expect much more of the same, and much worse, as these units hit the market.

>- -

Gee, my old Drake TR-72 is a 23 channel xtal controlled radio. I am not sure of the manufacture date, but I wonder if our dear friends at Drake were trying to sabotage the Ham bands?

BTW - this makes a great packet radio!

--sas

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Date: 12 Oct 93 04:57:58 GMT

From: news.service.uci.edu!paris.ics.uci.edu!ucivax!gateway@network.ucsd.edu

Subject: IRCI filters, anyone?

To: info-hams@ucsd.edu

Anyone out there have any experience with the IRCI SSB filters? I am interested in the 2.1 KHz filters for SSB, and wonder how good they are, AND how much they cut the audio from a normal 2.4 KHz filter. I was thinking about a pair of these filters for my TS 440, one at 455 and one at 8.8, I figure it would be pretty sharp, but how would it sound? I am not very happy with 1.8 filters, I tune my ear to them, and sometimes they really help, but the voices sound a bit thin. How is 2.1?

Just wondering....

Clark

.....

Clark Savage Turner, Graduate Student Researcher  
Safety Critical Software Group home:  
Department of Info. and Computer Science 1514 Verano Place  
Irvine, CA. 92717 Irvine, CA. 92715  
(714) 856 4049 (714) 856 2131

WA3JPG, QRP #3526, active on HF, VHF and UHF.  
ARRL Volunteer Counsel

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Date: Mon, 11 Oct 1993 14:54:14 -0800  
From: pipex!howland.reston.ans.net!agate!kos4mac19.berkeley.edu!user@uunet.uu.net  
Subject: Macintosh-based code practice?  
To: info-hams@ucsd.edu

Where would I find public domain Macintosh programs for learning  
and practicing code? Most of the ones I've heard about operate  
on PCs.

Email if possible (I'll summarize later).

Regards,  
Tim Ikeda  
timi@mendel.berkeley.edu

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Date: 11 Oct 1993 19:45:50 -0400  
From: swrinde!sdd.hp.com!col.hp.com!news.dtc.hp.com!hpscit.sc.hp.com!  
hpuerca.atl.hp.com!hpuerca!jab@network.ucsd.edu  
Subject: MOTOROLA  
To: info-hams@ucsd.edu

In <johng-081093164343@sce16.comm.mot.com> johng@ecs.comm.mot.com (John Gilbert)  
writes:

>So does this mean that you feel it is alright to modify those files on my  
>IBM mainframe that tell the operating system that I have paid the yearly  
>license fee?

>Or I wonder if the guy posting from DEC the other day would mind if I  
>modify the login program on my Decstation to allow more than two  
>simultanious users without paying DEC for the privilage? Once I make the  
>modifications, I am sure DEC wouldn't mind if I post if to the Internet.

So make your potential new customer sign a license agreement! (Though I think the mainframe approach is a hoot! The VMS /UNIX approach is more reasonable. But the customer's are warned up front with legal language.)

Your analogy is flawed. May I suggest: Your new computer has a firmware bit that enables higher speed or more memory. You sell them for different prices, depending on the speed. Is it illegal for a customer to flip that bit?

In every case I know of, it is not illegal. You can refuse support, refuse further sales, etc. But not take criminal action.

Because of this, some computer companies have serious encryption schemes in firmware. You modify the firmware (or some other form of stable storage) and the OS can tell. Very difficult to hack that one.

>Motorola doesn't have a problem with business radio equipment being used in >the ham bands or with hardware field modifications to the equipment. The >problem is people hacking software to turn on features which Motorola paid >to write, but that the customer hasn't paid to use. I have seen cases

Encrypt it! Make it difficult! But sue someone, and you will loose market share. Ask Lotus.

>where the software interactions from having several features turned on that >were never designed to be used together caused equipment or system >problems. Not to mention that changing codeplug bits in a radio is a good >way to wind up with a radio that will only power up and display the error >"FAIL 01/82" (corrupt radio EEPROM).

Caveat Emptor. Tell them the radio is broken due to non Motorola mods. Charge lots of money to fix it. Smile and say: "We are sorry the people who modified your radio did not know how to do it correctly. That will be \$XXXXXX." (Where \$XXX is 2X the cost of the Moto mods.)

I think the Moto ads probably will cost more in negative publicity than they will recover "lost" revenues.

I have seen several companies handle this type of issue in several different ways. My observation is that threats (even if not directed at the customers) will have a negative impact. Look how well the cable theft of services warnings have worked. (They have not.) And the public/congress pushed through the regulation act.

Put a technical solution in place rather than allow lawyers to hurt your company's image.

No flame, just puzzled how big "M" messed this one up.

Alan Barrow km4ba | If a little knowledge.....  
jab@atl.hp.com | is a dangerous thing.....  
..!gatech!kd4nc!km4ba!alan | then what is the Anti-Dote???

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Date: Tue, 12 Oct 1993 02:37:17 GMT  
From: csus.edu!netcom.com!grady@decwrl.dec.com  
Subject: Newsline #842  
To: info-hams@ucsd.edu

Gary Swiger (garys@Ingres.COM) wrote:

: Jewish amateur radio group running adds doesn't bother me - this is not a  
deviant  
: group. I suppose you wouldn't mind if manbla (another homo group) ran adds to.

I think homophobes are the truly deviant group among  
radio amateurs.

--  
'"PGP," warns Dorothy Denning, a Georgetown University professor  
who has worked closely with the National Security Agency,  
"could potentially become a widespread problem.' -- (E. Dexheimer)  
Grady Ward grady@netcom.com (707) 826-7715 [voice/24 hr FAX]

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Date: Mon, 11 Oct 1993 23:48:02 GMT  
From: sgi!odin!chuck.dallas.sgi.com!adams@ames.arp  
Subject: Sunspots  
To: info-hams@ucsd.edu

WANTED: database with weekly or monthly average of sunspots for the  
last N years, where N is large. in machine readable format, but if  
not, i'll type it in. it's that important.

thanks in advance,

chuck "doctor sunspot" adams (since the current trend is toward middle names)

CP-60

DXCC QRP 2W 40MTRS in progress

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Date: 11 Oct 93 20:57:12 GMT  
From: ncrgw2.ncr.com!ncrhub2!ncrclm!tskelton@uunet.uu.net  
Subject: Voice Keyers & TS850  
To: info-hams@ucsd.edu

Talk to KU4J. He has successfully integrated CT, the Kenwood system and board, and a cable with resistors. 73, Tom WB4IUX

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Date: 11 Oct 93 21:39:35 GMT  
From: ncrgw2.ncr.com!ncrhub2!ncrlnk!ncrwic!donald!kthompso@uunet.uu.net  
To: info-hams@ucsd.edu

References <29a3dv\$mq1@newsserv.cs.sunysb.edu>, <RR49ac2w165w@sytex.com>, <29bt0r\$1aq@newsserv.cs.sunysb.edu>ncrlnk  
Subject : Re: Turning in RFI generating PC's to FCC

Many of these operations get around the FCC by selling compliant components only. They will offer to assemble your pieces for a fee. They have not sold a complete system and so stay out of legal trouble.

--

Ken Thompson N0ITL  
Disk Array Hardware Development  
Peripheral Products MPD-Wichita  
NCR Corp. an AT&T company  
3718 N. Rock Road Wichita, Ks 67226  
(316) 636-8783  
Ken.Thompson@wichitaks.ncr.com

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Date: 12 Oct 1993 02:04:48 GMT  
From: swrinde!elroy.jpl.nasa.gov!usc!howland.reston.ans.net!newsserver.jvnc.net!  
udel!newsserv.cs.sunysb.edu!rick@network.ucsd.edu  
To: info-hams@ucsd.edu

References <RR49ac2w165w@sytex.com>, <29bt0r\$1aq@newsserv.cs.sunysb.edu>, <1993Oct12.003145.27168@ultb.isc.rit.edu>  
Subject : Re: Turning in RFI generating PC's to FCC

J.D. Cronin (jdc3538@ultb.isc.rit.edu) wrote:  
: In article <29bt0r\$1aq@newsserv.cs.sunysb.edu> rick@cs.sunysb.edu (Rick  
Spanbauer) writes:

: Sorry, Rick, but this was not the case (no pun intended) here. The  
: company in question assembles complete systems out of motherboards,  
: cabinets, I/O cards, etc. that other companies produce.  
: It was their choice to sell unshielded cabinets.  
: It was their choice to place FCC-part-15 sticker on a device  
: that certainly violates those regulations.  
: It was their choice to install unlicensed copies of DOS/Windows on it.  
: (Nothing to do with RFI, but a good example of their general attitude.)  
: People who hoist the Jolly Roger in the name of Corporate Profit  
: deserve an occaisional "whomp" upside the head.  
: 73...Jim

Jim, I'm all for letting the honest businessman have the benefit of the doubt and doubly so for keeping big government out of all of our lives. That said, if these guys are the pirates you say they are, then tally-ho! Let them have it :-) Rick , WB2CFV

Date: 12 Oct 93 00:13:05 GMT  
From: spool.mu.edu!sgiblab!rtech!ingres!garys@uunet.uu.net  
To: info-hams@ucsd.edu

References <35d\_9310101636@yyz.mbsun.mlb.org>, <1993Oct11.180201.15054@pony.ingres.com>, <jfhCEr30t.8Fo@netcom.com>  
Reply-To : garys@Ingres.COM (Gary Swiger)  
Subject : Re: Newsline #842

In article <jfhCEr30t.8Fo@netcom.com>, jfh@netcom.com (Jack Hamilton) writes:  
>garys@Ingres.COM (Gary Swiger) wrote:  
>  
>>I think it's a sad day for Amateur Radio when any special interest group tries  
>>to use Amateur Radio as a platform to promote their ideals - this is not the  
>>purpose of Amateur Radio...  
>  
>All Lamda wanted to do was to take out an ad. Do you object to QST running  
>ads by the Jewish amateur radio group?

Jewish amateur radio group running adds doesn't bother me - this is not a deviant group. I suppose you wouldn't mind if manbla (another homo group) ran adds to.

>  
>--  
>  
>-----  
>Jack Hamilton POB 281107 SF CA 94128 USA  
>ifh@netcom.com kd6tt1@w6pw.#nocal.ca.us.na

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Date: 11 Oct 1993 17:29:07 -0400  
From: concert!borg.cs.unc.edu!not-for-mail@decwrl.dec.com  
To: info-hams@ucsd.edu

References <29494rINN1rh@emx.cc.utexas.edu>, <750234021snx@skyld.tele.com>, <willmore.750369671@metropolis.gis.iastate.edu>g.cs.unc  
Subject : Re: Temporary IDs

My call is KD4CPL. It says so right there on my QCWA pin and right there on my Advanced license. I enjoy confusing people who assume that I must be a novice and/or a Novice based on my recently issued call.

Nick KD4CPL  
ex-KN4NYW, ex-WA4SXT, ex-WA3OCX, ex-WA4FJE

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End of Info-Hams Digest V93 #1211  
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